

11	20	..29	38	47	56
5'	GCGCC ATC AGC CGC CCG GGA GAT ATC CGC CGG GGG AGA ATA GGG TTG CAC CAT CCC				
65	74	83	92	101	110
AGA AGC TGC TGT TAG CTC GCC GGT CCT CGG CAC GCC GCC CGT TCG CCC CTG CGC CGC					
119	128	137	146	155	164
TGT CCG CCC TTC CCC TAG CGT TAC TTC CGG TCC CTC GCT GAG GGG GTT CGT CGT GCG					
173	182	191	200	209	218
GCT CCC AGG AGG CGT GAA CCG CGG ACC ATG AGC GTG GGC TTC ATC GGG GCC GGC	M	S	V	G	F
CAG CTG GCC TAT GCT CTG GCG CGG GGC TTC ACG GCC GCA GCC ATC CTG TCG GCT	A	R	G	I	G
Q L A Y A L A S P E M N L P T A G I L S A					
227	236	245	254	263	272
CAC AAG ATA ATA GCC AGC TCC CCA GAA ATG AAC CTG CCC ACG GTG TCC GGG CTC	H K I I A S S P E M N L P T V S A L				
281	290	299	308	317	326
CAC AAG ATG GGT GTG AAC CTG ACA CGC AGC AAC AAG GAG ACG TCC GGG CTC	R K M G V N L T R S N K E T V K H S				
335	344	353	362	371	380
AGG AAG ATG GGT GTG AAC CTG ACA CGC AGC AAC AAG GAG ACG GTG AAG CAC AGC					
389	398	407	416	425	434
GAC GTC CTG TTT CTG GCT GTG AAG CCA CAT ATC ATC CCC TTC ATC CTG GAT GAG	D V L F L A V K P H I I P F I L D E				

FIGURE 1A

J1000 U.S. PRO
09/01/9717

07/24/01

I	G	A	D	V	Q	A	R	H	I	V	S	C	A	A	G	V	443	452	461	470	479	488													
ATT	GGG	GCC	GAC	GTG	CAA	GCC	AGA	CAC	ATC	GTG	GTC	TCC	TGT	GCG	GCT	GGT																			
T	T	S	S	V	E	K	K	L	M	A	F	Q	P	A	P	K	V	497	506	515	524	533	542												
ACC	ATC	AGC	TCT	GTG	GAG	AAG	CTG	ATG	GCA	TTC	CAG	CCA	GCC	CCC	AAA	GTC																			
I	R	C	M	T	N	T	P	V	V	Q	E	G	A	T	V	Y	551	560	569	578	587	596													
ATT	CGC	TGC	ATG	ACC	AAC	ACA	CCT	GTG	GTA	GTG	CAG	GAA	GGC	GCT	ACA	GTG	TAC	605	614	623	632	641	650												
A	T	G	T	H	A	L	V	E	D	G	Q	L	L	E	Q	L	M	GCC	ACG	GGC	ACC	CAT	GCC	CTG	GTG	GAG	GAT	GGG	CAG	CTC	CTG	GAG	CAG	CTC	ATG
S	S	V	G	F	C	T	E	V	E	E	D	L	I	D	A	V	T	659	668	677	686	695	704												
AGC	AGC	GTG	GGC	TTC	TGC	ACT	GAG	GTG	GAA	GAG	GAC	CTC	ATC	GAT	GCC	GTC	ACG	S	S	V	G	F	C	T	E	V	E	D	L	I	D	A	V	T	
G	L	S	G	S	G	P	A	Y	A	F	M	A	L	D	A	L	A	713	722	731	740	749	758												
GAT	GGT	GGG	GGC	AGC	GGG	CCT	GCC	TAT	GCA	TTC	ATG	GCT	CTG	GAC	GCA	TTG	GCT	767	776	785	794	803	812												
D	G	G	V	K	M	G	L	P	R	R	L	A	I	Q	L	G	A	D	G	V	K	M	G	L	P	R	R	L	A	I	Q	L	G	A	

FIGURE1B

	821	830	839	848	857	866
CAG	GCT	TTG	CTG	GGG	GCT	GCC
Q	A	L	L	G	A	A
	875	884	893	902	911	920
CAG	CTT	AAG	GAC	AAT	GTC	TGC
Q	L	K	D	N	V	C
	929	938	947	956	965	974
TTT	CTA	GAG	AGT	GGG	GGC	TTC
F	L	E	S	G	G	F
	983	992	1001	1010	1019	1028
TGT	ATC	CGA	ACA	CGA	GAG	CTA
C	I	R	T	R	E	L
	1037	1046	1055	1064	1073	1082
GCT	GCC	CTT	AAG	ACC	CTC	TTA
A	A	L	K	T	L	L
	1091	1100	1109	1118	1127	1136
TCC	ACA	CTG	ACC	CCC	TCC	AGC
S	T	L	T	P	S	S
	1145	1154	1163	1172	1181	1190
GGA	GGC	AAG	AAG	GAC	TAA	GGC
G	G	G	K	K	D	D

FIGURE1C

1199	1208	1217	1226	1235	1244
GTT GAG AGC CCC TGC CGC CCC TGC CAC CCC CCT GCC CCG CTC CCA CCA TTG CCC					
1253	1262	1271	1280	1289	1298
CTC CTC AGC TGT GCA AGG AGA AAG CAT GCT TAG GAA GTT TTC AGG TCC TTG TGA					
1307	1316	1325	1334	1343	1352
TAA AAC CTC CTT AAA TCT GTT CAG ACC AAG CAA TGC GAG CCT CCT CTC CTG TCC					
1361	1370	1379	1388	1397	1406
CAT GTT GGA AGT TGC TCT GAA GGG GTG GTA GAT GCT GGA AGC CAG ACA CAA CCC					
1415	1424	1433	1442	1451	1460
TGC GTA CGC TGC TCA GTT GGT GGA GAC TGG GGC TGG GAC TGG AGT CAG CCC AGC					
1469	1478	1487	1496	1505	1514
TGG GAG GGG CTG GGG AGG ATC TGC AGC TGA AGC CCG AGG CAG GGT TGG TGT					
1523	1532	1541	1550	1559	1568
GAT GCC AAG GCA AAG TGG TGA GGA AAC AGG AAA CGG GCT TTC TCT GAA TTG					
1577	1586	1595	1604	1613	1622
GTA AAT GGG AAA GAA GTG AGC AAC TTA AGA TTG TCA CAA TTA ATC ACA AGT GTA					
1631	1640	1649	1658	1667	1676
CAG GAT TAG ACT GGG TTT ATA TTT AAC TCT TGC TTC ATA GGT GTA CCA TTT AAA					

FIGURE 1D

1685 1694 1703 1712 1721 1730
GAG TGT TAT TTA ATG CTA AGT TTA ACT GCT TTA ATA AAG TTT ATT TTT AAA TAT
1739
CAA AAA AAA AAA 3'

FIGURE 1E

1	M S V G F I G A G Q L A Y A L A R G F T A A G I L S A H K I I A S S P	2278458
1	M S V G F I G A G Q L A F A L A K G F T A A G V L A A H K I M A S S P	g189498
36	E M N L P T V S A L R K M G V N L T R S N K E T V K H S D V L F L A V	2278458
36	D M D L A T V S A L R K M G V K L T P H N K E T V Q H S D V L F L A V	g189498
71	K P H I I P F I L D E I G A D V Q A R H I V V S C A A G V T I S S V E	2278458
71	K P H I I P F I L D E I G A D I E D R H I V V S C A A G V T I S S I E	g189498
106	K K L M A F Q P A P K V I R C M T N T P V V V Q E G A T V Y A T G T H	2278458
106	K K L S A F R P A P R V I R C M T N T P V V V R E G A T V Y A T G T H	g189498
141	A L V E D G Q L L E Q L M S S V G F C T E V E E D L I D A V T G L S G	2278458
141	A Q V E D G R L M E Q L L S T V G F C T E V E E D L I D A V T G L S G	g189498
176	S G P A Y A F M A L D A L A D G G V K M G L P R R L A I Q L G A Q A L	2278458
176	S G P A Y A F T A L D A L A D G G V K M G L P R R L A V R L G A Q A L	g189498
211	L G A A K M L L D S E Q H P C Q L K D N V C S P G G A T I H A L H F L	2278458
211	L G A A K M L L H S E Q H P G Q L K D N V S S P G G A T I H A L H V L	g189498

FIGURE 2A

246 E S G G F R S L L I N A V E A S C I R T R E L Q S M A D Q E K I S P A 2278458
246 E S G G F R S L L I N A V E A S C I R T R E L Q S M A D Q E Q V S P A g189498

281 A L K K T L L D R V K L E S P T V S T L T P S S P G K L L T R S L A L 2278458
281 A T K K T I L D K V K L D S P A G T A L S P S G H T K L L P R S L A P g189498

316 G G K K D 2278458
316 A G K - D g189498

FIGURE 2B